IN THE CLAIMS

Please amend claims 52-54, and add new claims 55-62 as follows:

1. (Previously Presented) A lamella positionable in a headbox of a web production machine, said lamella being formed of at least one high-performance polymer; and

said at least one high-performance polymer comprising at least one of a water absorption (DIN 53495) and a heat resistance (DIN 53461) greater than that of polysulphone (PSU), thereby resulting in a lamella formed of a material having a high stability, high heat resistance, and good to very good resistance to at least one of alkaline solution and acid.

2. (Original) The lamella in accordance with claim 1, wherein said high-performance polymer has a tensile strength R_m (DIN 53455) in the range of about 50 N/mm^2 to about 150 N/mm^2, and a breaking elongation A_s (DIN 53455) in the range of about 20 % to about 80 %.

3. (Original) The lamella in accordance with claim 2, wherein said tensile strength R_m is in a range of about 70 N/mm^2 to about 110 N/mm^2, and said breaking elongation A_s is in a range of about 30 % to 60 %.

4. (Original) The lamella in accordance with claim 1, wherein said high-performance polymer has a modulus of elasticity E (DIN 53457, ISO 527-2) in a range of about 500 N/mm^2 to about 10,000 N/mm^2.

5. (Original) The lamella in accordance with claim 4, wherein said modulus of elasticity E is in a range of about 1,000 N/mm^2 to about 5,000 N/mm^2.

6. (Original) The lamella in accordance with claim 1, wherein said high-performance polymer has an impact strength when notched (ISO 179) of about 40 kJ/m^2 to about 100 kJ/m^2.

7. (Original) The lamella in accordance with claim 6, wherein said impact strength is in a range of about 45 kJ/m^2 to about 90 kJ/m^2.

8. (Original) The lamella in accordance with claim 1, wherein said high-performance polymer has a moisture acceptance FA (ISO 62) in the range of about 0.05 % to about 2 %.

9. (Original) The lamella in accordance with claim 8, wherein said moisture acceptance FA is in a range of about 0.2 % to about 1.2 %.

10. (Original) The lamella in accordance with claim 1, wherein said high-performance polymer has a heat resistance WB (DIN 53461) in the range of about 120°C to about 230°C.

11. (Original) The lamella in accordance with claim 10, wherein said heat resistance WB is in a range of about 170°C to about 220°C.

12. (Original) The lamella in accordance with claim 1, wherein said high-performance polymer has a low swelling Q in a range of about 0.02 % to about 0.2 %.

13. (Original) The lamella in accordance with claim 12, wherein said low swelling Q is a low linear swelling Q_L.

14. (Previously Presented) The headbox in accordance with claim 1, wherein said high-performance polymer comprises at least one of polyphenylene sulphone (PPSU), polyether sulphone (PES), and polyetherimide (PEI).

15. (Original) The lamella in accordance with claim 1, further comprising a nozzle, and said lamella includes a free end arranged to extend to a region of said nozzle,

wherein said free end comprises an structure less end region with a dull lamella end

having a height less than about 0.4 mm.

16. (Original) The lamella in accordance with claim 15, wherein said height of said dull lamella end is less than about 0.3 mm.

17. (Previously Presented) A lamella positionable in a headbox of a web production machine, said lamella being formed of at least one high-performance polymer comprising a heat resistance (DIN 53461) of at least greater than 120°C, and said headbox comprising a nozzle, and

said lamella includes a free end arranged to extend to a region of said nozzle,

wherein said free end comprises a structured end region with a dull lamella end having a height of more than about 0.5 mm.

18. (Original) The lamella in accordance with claim 17, wherein said structured end region comprises grooves having at least one of:

(A) at least one of essentially rectangular, wedge-shaped, parabolic, and essentially round structure, and

(B) varying depth.

19. (Original) The lamella in accordance with claim 17, wherein at least said lamella end is constructed of said at least one high-performance polymer.

20. (Original) The lamella in accordance with claim 1, wherein said lamella is constructed of said high-performance polymer in a homogenous structure.

21. (Original) The lamella in accordance with claim 1 in combination with a headbox with a sectioned fiber suspension density control, wherein said lamella is located within said headbox.

22. (Original) The lamella in accordance with claim 1 in combination with a headbox designed for a jet speed greater than about 1,500 m/s.

23. (Original) The lamella in combination with said headbox in accordance with claim 22, wherein the jet speed is greater than about 1,800 m/s.

24. (Original) The lamella in accordance with claim 1 in combination with a multi-layered headbox, wherein said lamella is integrated into said multi-layered headbox as a separating lamella.

25. (Original) The lamella in accordance with claim 1, wherein the web production machine comprises one of a paper, cardboard, and tissue machine.

26. (Previously Presented) A headbox of a web production machine comprising:

a lamella formed of at least one high-performance polymer having at least one of a water absorption (DIN 53495) and a heat resistance (DIN 53461) greater than that of polysulphone (PSU),

whereby said at least one high-performance polymer results in a lamella having high stability, high heat resistance, and good to very good resistance to at least one of alkaline solution and acid.

27. (Original) The headbox in accordance with claim 26, wherein the web production machine comprises one of a paper, cardboard and tissue machine.

28. (Original) The headbox in accordance with claim 26, wherein said high-performance polymer has a tensile strength R_m (DIN 53455) in the range of about 50 N/mm^2 to about 150 N/mm^2, and a breaking elongation A_s (DIN 53455) in a range of about 20 % to about 80 %.

29. (Original) The headbox in accordance with claim 28, wherein said tensile strength R_m is in a range of about 70 N/mm^2 to about 110 N/mm^2, and said breaking elongation A_s is in a range of about 30 % to 60 %.

30. (Original) The headbox in accordance with claim 26, wherein said high-performance polymer has a modulus of elasticity E (DIN 53457, ISO 527-2) in a range of about 500 N/mm^2 to about 10,000 N/mm^2.

31. (Original) The headbox in accordance with claim 30, wherein said modulus of elasticity E is in a range of about 1,000 N/mm^2 to about 5,000 N/mm^2.

32. (Original) The headbox in accordance with claim 26, wherein said high-performance polymer has an impact strength when notched (ISO 179) of about 40 kJ/m^2 to about 100 kJ/m^2.

33. (Original) The headbox in accordance with claim 32, wherein said impact strength is in a range of about 45 kJ/m^2 to about 90 kJ/m^2.

34. (Original) The headbox in accordance with claim 26, wherein said high-performance polymer has a moisture acceptance FA (ISO 62) in the range of about 0.05 % to about 2 %.

35. (Original) The headbox in accordance with claim 34, wherein said moisture acceptance FA is in a range of about 0.2 % to about 1.2 %.

36. (Original) The headbox in accordance with claim 26, wherein said high-performance polymer has a heat resistance WB (DIN 53461) in the range of about 120°C to about 230°C.

37. (Original) The headbox in accordance with claim 36, wherein said heat resistance WB is in a range of about 170°C to about 220°C.

38. (Original) The headbox in accordance with claim 26, wherein said high-performance polymer has a low swelling Q in a range of about 0.02 % to about 0.2 %.

39. (Original) The headbox in accordance with claim 38, wherein said low swelling Q is a low linear swelling Q_L.

40. (Previously Presented) The headbox in accordance with claim 26, wherein said high-performance polymer comprises at least one of polyphenylene sulphone (PPSU), polyether sulphone (PES), and polyetherimide (PEI).

41. (Original) The headbox in accordance with claim 26, further comprising a jet end, and said lamella includes a free end arranged to extend to a region of said jet end,

wherein said free end comprises an structure less end region with a dull lamella end having a height less than about 0.4 mm.

42. (Original) The headbox in accordance with claim 41, wherein said height of said dull lamella end is less than about 0.3 mm.

43. (Previously Presented) A headbox comprising:

a lamella formed of at least one high-performance polymer comprising a heat resistance (DIN 53461) of at least greater than 120°C;

a jet end, and

said lamella including a free end arranged to extend to a region of said jet end,

wherein said free end comprises a structured end region with a dull lamella end having a height of more than about 0.5 mm.

44. (Original) The headbox in accordance with claim 43, wherein said structured end region comprises grooves having at least one of:

(A) at least one of essentially rectangular, wedge-shaped, parabolic, and essentially round structure, and

(B) varying depth.

45. (Original) The headbox in accordance with claim 43, wherein at least said lamella end is constructed of said at least one high-performance polymer.

46. (Original) The headbox in accordance with claim 26, wherein said lamella is constructed of said high-performance polymer in a homogenous structure.

47. (Original) The headbox in accordance with claim 26, further comprising a sectioned stock density control.

48. (Original) The headbox in accordance with claim 26, wherein said headbox is sized for a flow speed greater than about 1,500 m/s.

49. (Original) The headbox in accordance with claim 48, wherein said flow speed is greater than about 1,800 m/s.

50. (Original) The headbox in accordance with claim 26, wherein said lamella is arranged as a separating lamella in a multi-layered headbox.

51. (Original) The lamella in accordance with claim 17, wherein said at least one high performance polymer comprises at least one of polyphenylene sulphone (PPSU), polyether sulphone (PES), polyetherimide (PEI), and polysulphone (PSU).

52. (Currently Amended) The ~~lamella~~ headbox in accordance with claim 43, wherein said at least one high performance polymer comprises at least one of polyphenylene sulphone (PPSU), polyether sulphone (PES), polyetherimide (PEI), and polysulphone (PSU).

53. (Currently Amended) A lamella positionable in a headbox of a web production machine, said lamella being formed of at least one high-performance polymer; and

said at least one high-performance polymer comprising one of polyphenylene sulphone (PPSU), polyether sulphone (PES), and polyetherimide (PEI) and having at least one of a water absorption (DIN 53495) and a heat resistance (DIN 53461) greater than that

of polysulphone (PSU), thereby resulting in a lamella formed of a material having a high stability, high heat resistance, and good to very good resistance to at least one of alkaline solution and acid.

54. (Currently Amended) A headbox of a web production machine comprising:

a lamella formed of at least one high-performance polymer comprising one of polyphenylene sulphone (PPSU), polyether sulphone (PES), and polyetherimide (PEI) and having at least one of a water absorption (DIN 53495) and a heat resistance (DIN 53461) greater than that of polysulphone (PSU),

wherein said at least one high-performance polymer results in a lamella having high stability, high heat resistance, and good to very good resistance to at least one of alkaline solution and acid.

55. (New) A lamella positionable in a headbox of a web production machine, said lamella being formed of at least one high-performance polymer; and

said at least one high-performance polymer comprising at least one of a water absorption (DIN 53495) and a heat resistance (DIN 53461) greater than that of polysulphone (PSU), thereby resulting in a lamella formed of a material having a high stability, high heat resistance, and good to very good resistance to at least one of alkaline solution and acid,

wherein, in at least at a free end of the lamella, the at least one high-performance polymer is homogenous.

56. (New) A method of installing the lamella of claim 55 in a headbox of a web production machine, the method comprising:

mounting one end of the lamella within the headbox; and

orienting a free end of the lamella in a flow direction.

57. (New) A method of installing the lamella of claim 1 in a headbox of a web production machine, the method comprising:

mounting one end of the lamella within the headbox; and

orienting a free end of the lamella in a flow direction.

58. (New) A method of installing the lamella of claim 17 in a headbox of a web production machine, the method comprising:

mounting one end of the lamella within the headbox; and

orienting the free end of the lamella in a flow direction.

59. (New) A method of installing a lamella in the headbox of claim 26, the method comprising:

mounting one end of the lamella within the headbox; and

orienting a free end of the lamella in a flow direction.

60. (New) A method of installing a lamella in the headbox of claim 43, the method comprising:

mounting one end of the lamella within the headbox; and

orienting the free end of the lamella towards the jet end.

61. (New) A method of installing the lamella of claim 53 in a headbox of a web production machine, the method comprising:

mounting one end of the lamella within the headbox; and

orienting the free end of the lamella in a flow direction.

62. (New) A method of installing a lamella in the headbox of claim 54, the method comprising:

mounting one end of the lamella within the headbox; and

orienting a free end of the lamella in a flow direction.